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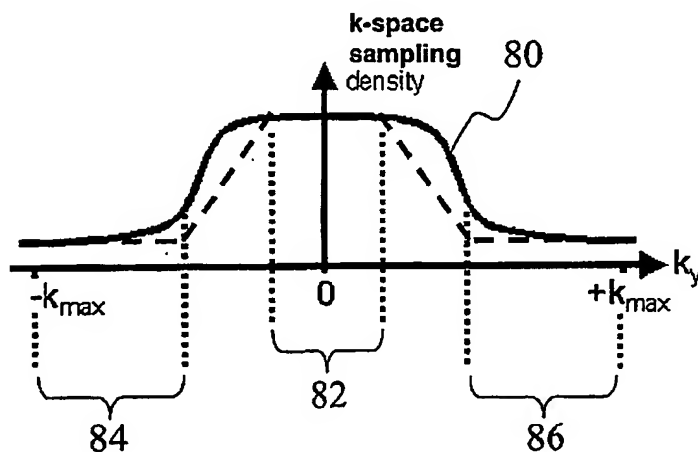
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(54) Title: **REGULARIZED VARIABLE DENSITY SENSE**



(57) Abstract: A magnetic resonance imaging apparatus includes a plurality of radio frequency coils (34) that acquire variable density sensitivity encoded data that is undersampled at least away from the center of k-space. A reconstruction processor (52) for each coil reconstructs: a regularization image reconstructed from a higher density portion of the variable density sensitivity encoded data disposed at or near a center of k-space acquired by that coil; and a folded image reconstructed from the variable density sensitivity encoded data acquired by that coil. An unfolding processor (66) unfolds the folded images. The unfolding is regularized by the regularization images.



FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

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